Please replace the paragraph at page 17, line 10-13, with the following paragraph:

--FIG. 7 shows the base sequence of DNA (SEQ ID NO: 34) encoding the polypeptide (SEQ ID NO: 33) (mouse type) of the present invention obtained in Example 6, and the amino acid sequence deduced from the base sequence.--

REMARKS

Applicants request the Examiner to enter the changes in the specification requested above. These changes are being made pursuant to the Notification of Defective Response mailed March 11, 2002, containing a request for a revised sequence listing.

Applicants submit herewith Revised Sequence Listing pages 1-28 to include as a revised sequence listing as part of this Application.

Applicants have amended the Application to include the sequence identification number in the specification where reference is made to the sequence. No new matter has been added by virtue of the amendment made to the specification.

Further enclosed is a computer readable copy of the above-mentioned copy of the Sequence Listing.

Also enclosed is a Statement in Support of Filing and Submissions in Accordance with 37 CFR 1.821-1.825, which declares that the content of the paper and the computer readable copies of the Sequence Listing are the same.

In view of the foregoing amendments and remarks, the present application is respectfully considered in condition for allowance. An early reconsideration and notice of allowance are earnestly solicited.

Although it is not believed that any additional fee is required to consider this submission, the Commissioner is hereby authorized to charge our deposit account no. 04-1105 should any fee be deemed necessary.

Respectfully submitted,

Date: April 5, 2002

Kathryn A. Piffat, Ph.D.

Kathryn A. Piffat, Ph.D. (Reg. No. 34,901)
Dike, Bronstein, Roberts & Cushman
Intellectual Property Practice Group of
EDWARDS & ANGELL, LLP
P.O. Box 9169
Boston, MA 02209
(617) 439-4444

APPENDIX I

REVISIONS OF THE SPECIFICATION PURSUANT TO REVISED RULE § 1.121

In the specification:

The paragraph at page 2, lines 14-27, should be replaced with the following paragraph:

--FMRF (SEQ ID NO: 59) amide, one of physiologically active peptides, is a peptide isolated from the ganglia of bivalve, which structure was determined for the first time (Price, D.A. & Greenberg, M.J., Science, 197 670-671, 1977). Since then it has turned out that peptides having an RF amide structure at the C terminus and peptides having a structure similar to the RF amide structure are present over many species of the invertebrate animal. Many peptides having the RF amide structure are reported to be present especially in the nematodes. It is also known that most of these peptides are borne on one gene in such a state that a plurality of peptides is contiguous (Nelson, L.S., et al., Molecular Brain Research, 58, 103-111, 1998).--

The paragraph at page 2, line 28, to page 3, line 9, should be replaced with the following paragraph:

--Turning to the vertebrate animal, LPLRF (SEQ ID NO: 60) amide was isolated from the brain of chicken and identified to be an FMRF (SEQ ID NO: 59) amide-like peptide having the RF amide structure. However, its gene structure remains yet unknown (Dockray, G.J., et al., Nature, 305, 328-330, 1983). In fish, C-RFa was recently reported to be a peptide with the RF amide structure. As peptides containing the RF amide structure in mammal, there are known two peptides purified and isolated from bovine (Yang, H.-Y. T., et al., Proc. Natl. Acad. Sci. USA, 82, 7757-7761, 1985) and neuropeptide SF (NSF) and neuropeptide AF (NAF) isolated from human cDNA, which are considered to correspond to the two peptides above. Recently, the present inventors identified prolactin-releasing peptides (PrRP) containing the RF amide structure in human, bovine and rats (Hinuma, S., et al., Nature, 393, 272-276, 1998).--

The paragraph at page 3, lines 10-19, should be replaced with the following paragraph:

--Various reports have been published on the physiological activities of the FMRF (SEQ ID NO: 59) amide peptides, which include, for example, acceleration or suppression of heartbeats, contraction or relaxation of various radular muscle, visceral muscle and retractor muscle, and hyperpolarization or depolarization of nerve cells. With respect to PrRP and LPLRF (SEQ ID NO: 60) amides, prolactin-releasing stimulation activity, and nerve cell-stimulating effects or hypertension effects are reported, respectively.--

The paragraph at page 5, lines 26-35, should be replaced with the following paragraph:

--In order to solve the foregoing problems, the present inventors have made extensive studies and as a result, succeeded in preparing primers based on the sequence information such as EST and cloning cDNA having a novel base sequence by RT-PCR using poly(A)$^+$ RNA of human fetal brain as a template. The present inventors have thus found that polypeptides encoded by the thus obtained cDNA are useful peptides in which the C terminal structure is LPL RF (SEQ ID NO: 60) amide-, LPL RS (SEQ ID NO: 61) amide-, LPQ RF (SEQ ID NO: 62) amide- or LPLRL (SEQ ID NO: 63) amide-like.--

The paragraph at page 16, lines 24-27, should be replaced with the following paragraph:

--FIG. 1 shows the base sequence of DNA (SEQ ID NO: 2) encoding the polypeptide (SEQ ID NO: 1) (human type) of the present invention obtained in Example 2, and the amino acid sequence deduced from the base sequence.--

The paragraph at page 16, lines 30-33, should be replaced with the following paragraph:

--FIG. 3 shows the base sequence of DNA (SEQ ID NO: 9) encoding the polypeptide (SEQ ID NO: 8) (human type) of the present invention obtained in Example 3, and the amino acid sequence deduced from the base sequence.--

The paragraph at page 16, line 34, to page 17, line 2, should be replaced with the following paragraph:

--FIG. 4 shows the base sequence of DNA (SEQ ID NO: 15) encoding the polypeptide (SEQ ID NO: 14) (bovine type) of the present invention obtained in Example 4, and the amino acid sequence deduced from the base sequence.--

The paragraph at page 17, lines 3-6, should be replaced with the following paragraph:

--FIG. 5 shows the base sequence of DNA (SEQ ID NO: 19) encoding the polypeptide (SEQ ID NO: 18) (rat type) of the present invention obtained in Example 5, and the amino acid sequence deduced from the base sequence.--

The paragraph at page 17, lines 7-9, should be replaced with the following paragraph:

--FIG. 6 shows comparison of the amino acid sequences (SEQ ID NOS 8, 4, and 18, respectively in order of appearance) of the polypeptides of the present invention obtained in Examples 3, 4, and 5.--

The paragraph at page 17, line 10-13, should be replaced with the following paragraph:

--FIG. 7 shows the base sequence of DNA (SEQ ID NO: 34) encoding the polypeptide (SEQ ID NO: 33) (mouse type) of the present invention obtained in Example 6, and the amino acid sequence deduced from the base sequence.--